

Abstract

A common communication language that can address all the applications running in a multitude of set top boxes (STBs) or client devices and application servers. The present invention, DATP protocol encapsulates a meta language that provides a generic portable communication application programmer interface that requires light processor utilization and is well-suited for a typical STB possessing limited processing power. DATP requires relatively few processing cycles compared to typical Internet communication protocols. DATP reduces the overhead of the communication protocol handler at the STB and makes the communication protocol handler common for all STBs applications. The preferred DATP protocol is portable for all STBs since it is written in a native language that interfaces with the underlying operating system of the STB. A SGW (SGW) performs as a DATP server. The SGW translates between DATP messages and standard communication protocols. SGW enables SP clients at STBs utilizing DATP to communicate with service applications using a variety of communication protocols. A content converter is provided to convert standard Web content into content suitable for display on a client viewing device, e.g., a TV.